



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY

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April 16, 2003

Ref: 8EPR-N

Nancy Doelger
Casper Field Office
Bureau of Land Management
2987 Prospector Drive
Casper, WY 82600

Re: South Powder River Basin Coal
DEIS, # 030046

Dear Ms. Doelger:

The Environmental Protection Agency -- Region 8 has reviewed the *Draft Environmental Impact Statement for South Powder River Basin Coal*. The DEIS assesses the environmental impacts of five lease by application (LBA) tracts submitted by four coal mines located south of Gillette, WY. We submit the following comments in accordance with our responsibilities under the National Environmental Policy Act (NEPA) and Section 309 of the Clean Air Act.

We appreciated the multi-agency coal meeting held earlier this month regarding coal leasing in the Powder River Basin and some of the specific issues for this EIS. We hope these types of discussions will continue and would welcome any further opportunities to discuss our comments on this and future coal mining EISs.

EPA's main concern is air quality in the Powder River Basin (PRB). These coal mines are some of the many sources in the PRB contributing to air quality degradation. EPA has been working closely with the BLM and WY DEQ through the PRB Coalbed Methane EIS to address air quality concerns in the Basin. Although the WY DEQ has by statute, the authority and responsibility to implement air quality mitigation, the FEIS should disclose all mitigation for air quality impacts regardless of BLM's jurisdiction (CEQ 40 Questions #19b). The FEIS should outline the regulatory and nonregulatory processes that are underway to address air concerns through the PRB EIS process, as well as include all mitigation under BLM jurisdiction.

Recent air quality monitoring for two of these coal mines has shown exceedances of the PM₁₀ (particulate matter less than 10 micrometers in diameter, commonly referred to as fugitive dust) air standard. Air quality models also predict additional increases in PM₁₀ emissions for this mining area, potentially increasing exceedances of the air quality standards. As we will discuss later in this letter, there are some difficulties in the air quality modeling and permitting for this

area that will not be resolved during the time frame for this EIS. We are, therefore, recommending that the FEIS concentrate on more fully disclosing the air quality impacts, including potential human health effects and developing additional mitigation to reduce fugitive dust at the mines and in the surrounding area.

EPA also has concerns about the impacts of nitrogen dioxide emissions from blasting activities and whether or not existing mitigation is sufficient. EPA is also concerned about wildlife impacts to raptors, sage grouse and the long-term implications of coal mining on wetlands in the basin.

Based on the procedures EPA uses to evaluate the potential effects of proposed actions and the adequacy of the information in the DEIS, the proposed alternative will be listed in the Federal Register in the category EC-2 (EC - Environmental Concerns, 2 - Insufficient Information). This rating means that the review identified environmental impacts that should be avoided in order to fully protect the environment and the DEIS does not contain sufficient information to thoroughly assess environmental impacts that should be avoided to fully protect the environment. Please see the following detailed comments for specifics on our environmental and information concerns.

We appreciate your interest in our comments. If you have any further questions, please contact Dana Allen of my staff at (303) 312-6870.

Sincerely,

O/s/b PSS

Cynthia Cody
Director, NEPA Program
Office of Ecosystems Protection
and Remediation

Environmental Protection Agency - Region 8 Detailed Comments
South Powder River Basin Coal DEIS
April 16, 2003

Air Quality

PM₁₀, Fugitive Dust

1. As discussed in recent meetings and other EIS reviews, there are cumulative and site specific PM₁₀ air quality problems in the Powder River Basin. Air monitors have recorded exceedances of National Ambient Air Quality Standards (NAAQS) for fugitive dust (PM₁₀) at two of the coal mines. The air quality situation is further complicated by inconsistencies between two different models and monitoring data that already exceeds the maximum values both models predicted for PM₁₀. Because much of this problem cannot be resolved in this EIS process, we recommend that the FEIS focus on disclosing the air quality impacts (environmental consequences) including human health and discussing the major information and modeling problems. The FEIS should also more fully evaluate mitigation for reducing PM₁₀ through future actions tiering from this NEPA analysis such as the coal mining permits and other area wide and/or voluntary mitigation efforts.
2. Annual PM₁₀ NAAQS Exceeded in the PRB The FEIS needs to accurately reflect exceedances of the annual NAAQS in the Powder River Basin.
 - a. For example the FEIS states on page 4-34, fourth paragraph that there has not been exceedances of the PM₁₀ annual NAAQS, North Rochelle Mine 0874 monitor (AIRS ID 56-005-0874) had an annual arithmetic mean in 2000 of 55 µg /m³. When calculated in accordance with 40 CFR Part 50, Appendix K (equally weighted mean of 4 quarterly means) the annual mean is 51 µg /m³. The annual NAAQS is 50 µg /m³. This exceedance is shown in Table AQ-2 of the Air Quality Appendix (Appendix E).
 - b. Similarly, the North Rochelle Mine 0907 monitor (AIRS ID 56-005-0907) recorded an annual average (40 CFR Part 50, Appendix K) of 51 µg /m³ in 2001. This exceedance is also shown in Table AQ-2 of the Air Quality Appendix (Appendix E).
3. Current Monitoring Data Exceeds Predictions of Wyoming DEQ Permit Model The theory of PM₁₀ control in the Wyoming PRB coal mines is: (1) Wyoming DEQ uses a conservative Fugitive Dust Model to determine coal production levels that will not exceed annual NAAQS at any monitor when required BACM (Best Available Control Methods) is used. (2) Monitoring data is used (in the absence of accurate short term models) to show that at actual production levels, 24-hour PM₁₀ NAAQS exceedances do not occur (and confirm compliance with the Annual NAAQS).

When monitoring does not correspond to the predictive model, this indicates that the assumptions and input to the model need to be reassessed. This is particularly important when we have data documenting exceedances and the model predicts that the mines will be in

compliance with the standard. Unfortunately, monitoring data showing exceedances at Black Thunder and North Rochelle since 2000 have shown the current air quality control approach to be flawed. Both annual and 24-hour PM₁₀ exceedances have occurred. We have listed below some potential causes of the disparity between the air permit model and monitoring data:

- a. The current DEQ Permit model under predicts mine emissions even with implemented BACM.
- b. BACM, while required, was not in place when exceedances occurred.
- c. The background level is higher than that assumed.
- d. New, unmodeled sources have been introduced near the problem monitors.

No matter which of these situations is the actual cause or a combination, either mine emissions or other emissions must be reduced before production at the permitted level will be in compliance with PM₁₀ standards.

4. Air Modeling Discrepancies The DEIS combines information from two separate and incompatible air quality analyses: (1) The Air Quality Analysis for the Wyoming and Montana CBM EIS, and (2) permit analyses by the Wyoming DEQ for each individual mine. Unfortunately, the two air quality analyses use different techniques, which in some cases are incompatible. As shown in the table below, the direct and indirect PM₁₀ impacts from the coal mines (average = 29.2) are greater than the cumulative impact (21). Cumulative impacts include: the sum of direct and indirect impacts from the proposed project, and impacts from all other current and reasonably foreseeable activities.

The following sections describe some of the discrepancies between the analyses.

- a. Inconsistent Use of Background PM₁₀ Concentration The CBM EIS uses a background annual PM₁₀ level of 17 µg /m³; the SPRB Coal EIS states that this is also the background assumed for this EIS on page 3-19, Table 3-1. In contrast, the DEQ air permit analyses use a background level of 15 µg /m³. For some mines, the DEQ permits production that would lead to PM₁₀ concentration increases of 34.94 µg /m³ (49.94 µg /m³ – 15 µg /m³ = 34.94 µg /m³), page 4-21. If the CBM/South PRB Coal background is used, the DEQ permit analyses result in predicted NAAQS exceedances for annual PM₁₀. The simple presentation of results using two different backgrounds without explanation gives the EIS the appearance of selectively choosing background levels to give predictions less than the NAAQS. More explanation and justification for using two different background levels is needed, particularly in light of existing measurements near or above the annual NAAQS for production levels less than those permitted or expected in the future.
- b. Inconsistency in Air Quality Analysis Results The CBM analysis assumes the higher background level, and includes more sources than the Wyoming DEQ permit analyses, but results in lower concentration predictions. The table below illustrates how the differences in treatment of mine sources by the two analyses lead to radically different results.

Direct and Indirect Impacts Section			
	DEQ Maximum predicted annual PM ₁₀ concentration	DEQ Mine PM ₁₀ ¹ (background 15)	DEIS Page
North Antelope/Rochelle mine	49.94 µg/m ³	34.94 µg/m ³	4-21
Black Thunder mine	34.96 µg/m ³	19.96 µg/m ³	4-25
North Rochelle mine	42.7 µg/m ³	27.7 µg/m ³	4-31
Antelope mine	49.2 µg/m ³	34.2 µg/m ³	4-36
Cumulative Impact Section			
	BLM Max	BLM, all RFAA ² (back ground 17)	Page
All mine operations, Coal Bed Methane development, and all other existing and permitted sources, and background concentrations	21 µg/m ³	4	4-106, Table 4-21

The PM₁₀ cumulative impact of 21 µg/m³ from the CBM analysis is clearly incompatible with a direct impact of permitted mines of 19.96 to 34.96 µg/m³, and a cumulative impact of mining plus background of 34.96 to 49.96 µg/m³. If both these results are to be presented in the same document, some effort to reconcile these contradictory predictions must be made. Since the Wyoming DEQ predictions are more relevant for the subject DEIS, the Air Quality Appendix should at least mention this analysis, and preferably emphasize the mine analysis over the Coal Bed Methane analysis which does not represent near field mine impacts as accurately as does the DEQ Analysis.

5. Wyoming DEQ Permit Analysis The DEQ analysis process is not described adequately in the Air Quality appendix. The results are first presented in the Executive Summary without attribution. The results in the Executive Summary should be labeled as annual PM₁₀ to differentiate from 24 hour concentrations. We recommend the figures in the Executive Summary be labeled as “Wyoming DEQ Permit Analysis Results,” and the reader be directed to the portion of the Air Quality Appendix where the method and appropriateness of these analyses are discussed.
6. Use of High Winds as an Explanation for PM₁₀ Exceedances On pages 4-28, 4-29, 4-31 and 4-34, drought conditions along with higher wind speeds in the December 2001 through

¹DEQ Mine PM₁₀ = DEQ maximum - background

² RFFA – Reasonably Foreseeable Future Action

February 2002 time frame are suggested as an explanation for some of the PM₁₀ exceedances observed at the Black Thunder and North Rochelle mines. Only in very limited conditions, can high winds and drought conditions be used as acceptable reasons for NAAQS exceedances. The NAAQS apply and are to be met in worst case, as well as typical, normal meteorological conditions. EPA guidance (Areas Affected by PM-10 Natural Events, Mary D. Nichols, 1996) defines when data may be excluded from regulatory consideration because of high winds. This can only occur if (1) sources of dust are natural, or (2) sources are anthropogenic but have BACM required and in-place at the time of the wind event (winds are shown to be great enough to overcome the implemented BACM). To date, Wyoming has only placed a high wind flag on one of the 19 exceedances recorded at the South PRB mines since 2001.

The Wyoming DEQ permit model should be using some representative year of winds for its meteorological inputs which include both high and low wind days. With annual NAAQS exceedances in both 2000 and 2001 at the North Rochelle monitors, sustained winds greater than average over a 3 year period are unlikely to be the explanation for all the exceedances observed, and should not be implied without acceptable statistical justification. There is no drought flag to excuse particulate exceedances, except when it can be shown that drought reduces the wind speed at which BACM is no longer adequate. In other words, sources are expected to comply with the NAAQS during drought and typical high wind events.

7. Cumulative Impacts Above the PSD Class II Increment The maximum cumulative annual PM₁₀ impact presented in the Wyoming DEQ permit analyses is 34.9 µg /m³ at the North Antelope/Rochelle Mine (page 4-20). This exceeds the PSD Class II allowable increment for annual PM₁₀ of 17 µg /m³. This impact should be reported in table 4-21, Cumulative Impacts. The State's reasoning behind this permitted level should be discussed (i.e., only some stated fraction of the mine emissions consume increment based on the permits in place in the baseline year of 1997, and this portion of emissions when combined with other new actual and permitted emissions, results in less than 17 µg /m³ of cumulative impact).

Nitrogen Dioxide

8. Nitrogen Dioxide Some progress has been made by the State and the mining industry in reducing the risk to local residents and travelers from the discharge of nitrogen dioxide from mining blasts. However, releases of nitrogen dioxide are still of concern because of the toxicity of the gas at relatively low levels, the large percentage of the population with respiratory conditions which would render them sensitive to NO₂, and the lack of a technical method to reliably prevent NO₂ generation.

There are several areas that should be addressed more fully to disclose potential impacts and determine if additional mitigation may be needed. The FEIS should be revised to:

- a. Use a concentration of nitrogen dioxide in analyzing the risk and developing mitigation which will prevent adverse health effects, including sensitive members of the population,
- b. Identify receptors that may be impacted by nitrogen dioxide releases (e.g., residences, public roads, bus stops, etc.),

- c. Describe more fully the actions and implementation procedures that the mines and the State have already implemented to reduce NO₂ releases from blasting.
9. Safe Concentrations of Nitrogen Dioxide As discussed in the DEIS, EPA recommends that concentrations not exceed 0.5 ppm to protect sensitive members of the public. Similarly the NIOSH recommendation, which is applicable only to workers, is a limit of 1 ppm based on a 15 minute exposure that should not be exceeded at any time during the workday. The NIOSH recommendation is only for adult, healthy workers, during the workday. It is not designed to protect the general public, which includes infants, the elderly and other sensitive members of the population. The OSHA permissible exposure limit is 5 ppm, determined as a ceiling value. This means that the concentration must not be exceeded during any part of the workday, as measured instantaneously. This value was developed for workers, considering not just their health, but their remuneration and costs to industry to implement the standard. It is not protective of the general public (as described above for the NIOSH recommendation), and is inappropriate for those who are involuntarily exposed to toxicants. The Immediately Dangerous to Life or Health (IDLH) concentration is 20 ppm.

In reviewing the DEIS, it appears that less protective criteria were used in analyzing the impacts and in developing mitigation. The Thunder Basin Coal Company's study of developing safe setback distances for blasting activities recommended a criteria of 8 ppm NO₂ and it appears that the setback study used 5 ppm (based on a 10 minute average), exceeding EPA's and NIOSH recommendations, and OSHA limits. The impacts analysis needs to assess if there is still a potential for nitrogen dioxide levels to exceed 0.5 ppm on public roads, residences or other public access areas. The BLM and OSM need to ensure that public health is protected from mining operations. We recommend that the blasting setback distances be recalculated using 0.5 ppm.

10. Nitrogen Dioxide Concentrations Pages 4-18 & 19, summarize information on nitrogen dioxide emissions from an April 2000 study prepared by the Wyoming Mining Association. The fourth paragraph on page 4-19 states "The maximum 15 minute average valid values observed for each of the six monitors ranged from 0 to 1.65 ppm NO₂" in areas accessible to the public near mining operations. Although we have not seen this report, it appears that additional monitoring has been conducted that shows nitrogen dioxide levels exceeding levels of concern. For example in the *Black Thunder Mine Report for Development of Safe Setback Distances for Blasting Activities at the Black Thunder Mine*, dated July 2002, the 10-minute average for NO₂ ranged from nondetectable to 20.4 ppm (IDLH = 20 ppm). We assume that the 20.4 ppm (overburden shot # 198202) value was measured in an area that was not accessible to the public. However, the wide range of concentrations demonstrates that nitrogen dioxide concentrations are highly variable and do range into toxic levels. Of more concern, are several of the monitoring events which measured concentrations exceeding the health recommendations several thousand feet from the mining blasts. Appendix J. of the report lists 5.5 ppm NO₂ at 5,267 feet (cast # 844), 2.1 ppm at 5,368' (cast # 860), and 16.5 ppm at 2,186' (cast # 887). This section in the FEIS should be revised to more fully reflect the range of known nitrogen dioxide emissions. If the data are available, this section should

also incorporate the changes in nitrogen dioxide emissions since the mines began developing new blasting methods to reduce nitrogen dioxide emissions.

11. Affected Environment for Nitrogen Dioxide Emissions The FEIS needs to identify the residences, roads and other potential avenues of exposure to nitrogen dioxide. As described in section 3.16, there is one occupied dwelling immediately adjacent to the NARO North LBA tract and one dwelling near the Little Thunder LBA tract (alternative 2). As described in section 3.17, there are several roads that cross these tracts such as State Highway 450, Piney Canyon Road, Antelope Road, Reno Road, etc. The FEIS should describe the potential risks to people living or traveling in this area. Are there any additional residences or school bus stops in this area? How much public traffic crosses through the mines during blasting?
12. Mitigation for Nitrogen Dioxide Emissions According to pages 3-24 & 25, the mines have already implemented voluntary measures to reduce NO₂ emissions. Because the measures are voluntary, mines may choose not to implement the mitigation measures. The FEIS needs to disclose the impacts for both scenarios. It appears that the Black Thunder Mine has some more rigorous measures as listed on page 3-26. However, it is not clear if these measures are mandatory or are also voluntary. It should also be noted that the measures for the mines do not include a prohibition of blasting when conditions are unfavorable (large blast, wet conditions, weather inversions, little wind, wind direction towards residences/road, etc.) The existing mitigation merely requires notification and monitoring. We recommend that a stipulation be added to the lease prohibiting blasting when conditions are unfavorable. The mines would then need to analyze the size of blasts in conjunction with weather conditions and potential public exposure, to prevent exceedances of the EPA and NIOSH recommended toxicity levels.

The FEIS also needs to more fully describe the types and levels of mitigation and how the mitigation will be implemented to reduce exposure to nitrogen dioxide. For example we understand that several of the mines have reduced the sizes of blasts, changed the composition of the material used for blasting, and/or changed the placements of blasting agents. Are these measures required or are they voluntary? Are all four mines implementing these measures? It appears that blasting setback distances have been calculated only for the Black Thunder mine. The FEIS should explain how the setback distances will be implemented and if there are any setback distances calculated for the other mines. Also as mentioned above, we recommend that the setback distances be recalculated using the EPA recommended 0.5 ppm NO₂.

Cumulative Impacts

13. Direct & Indirect Impact Analysis Vs. Cumulative Impacts In the DEIS, there are some inconsistencies between the direct and indirect impact analysis and the cumulative impact sections. This is understandable as the majority of the cumulative impact sections were taken from the PRB Coalbed Methane EIS and the direct and indirect analyses were prepared specifically for this EIS. These inconsistencies become an issue for resources which are

substantially affected by cumulative impacts. For several of these resources, the direct and indirect impacts predicted in the DEIS are likely to be different from the actual impacts because of expected changes to the resource as a result of other activities (e.g., the wells that are predicted to be affected or unaffected by coal mining may already be dry because of coalbed methane production). The relative magnitude of direct and indirect impacts may also change as a result of cumulative impacts (e.g., wildlife habitat) or there may be synergistic impacts from the coal mines and other development (e.g., noxious weeds).

We recommend that the impact sections for resources that are substantially impacted by cumulative impacts be reevaluated to determine how the impacts will overlap in time and for the resource as a whole. For example, does the timing of maximum impact from other activities (e.g., coalbed methane) coincide with the peak of impacts from coal mining? Are any resources impacted by coal mining approaching sustainability limits because of cumulative impact levels? The relationship between project and cumulative impacts might be more easily understood if the FEIS were to combine the Environmental Consequences and Cumulative Impact sections to more clearly disclose the overall condition or impacts on each resource. The BLM may also want to consider this approach in general for future EISs. EPA has seen several EISs which are organized on a resource or issue basis, eliminating the duplication found when discussing the resource in separate Affected Environment, and Environmental Consequences and Cumulative Impacts sections. The following comments explain our concerns in more detail and on a resource specific basis.

14. Groundwater Cumulative Impacts The direct and indirect impacts analysis for groundwater drawdown on pages 4-42 → 4-56 is misleading without the information from the cumulative impacts discussion on pages 4-121 → 4-126. By analyzing coal mining drawdown independently of the larger drawdown predicted from coalbed methane, the EIS predicts a relatively limited number of wells will be impacted by drawdown instead of the large number predicted as a result coalbed methane development. Although the cumulative impacts section eventually discusses these issues, the direct and indirect analysis also needs to reflect the condition of the resource that will be likely during coal mining. For example, the wells that are predicted to be impacted by the coal mines are listed in various tables such as Table 4-1-*Water Supply Wells Possibly Subject to Drawdown If West Antelope LBA Tract Is Mined*. This table identifies six wells which are anticipated to be impacted by drawdown. However, when the drawdown impacts of coalbed methane are added, it appears that all of the wells evaluated (78) are likely to be impacted by the combined drawdown. The section should be revised to more fully explain the total number of wells that will be impacted by drawdown and how the drawdown impacts will be a mitigated or compensated when there are several activities which are causing the impacts.

For example page 4-57 (3rd paragraph) states that the mine operator would be required to replace water supply wells if they are impacted by mining. According to page 4-129 (paragraph 4), for wells impacted by coalbed methane, there is only an agreement for water well monitoring and mitigation will be on a case-by-case basis. How will the obligation for well replacement be implemented for wells that are impacted both by mining and coalbed methane?

15. Cumulative Impacts, Reasonably Foreseeable Future Actions The cumulative impact analysis should include additional coal and energy development activities. The reasonably foreseeable future activities list on page 4-5 only looks at projects with firm plans. However, it is apparent from the history of the area, current trends, existing infrastructure, and coal and other energy reserves; that coal mining and energy development will continue to expand. For example, the 16 active coal mines are in a row from north of Gillette to the David Johnston mine. It appears likely that these mines will continue to grow and fill in this area creating a continuous strip of mines and reclaimed mines for 100 miles. Estimating a width of mining of 10 miles, this potential strip of coal mines would cover one thousand square miles. Given the huge scale of energy development in this area, there is a strong potential for permanent large-scale impacts for habitat (fragmentation, loss of vital habitat) ground water, riparian ecosystems, wetlands and noxious weeds. Areawide air and water quality impacts will also be significant.

This broader cumulative impact analysis should also factor in the success of reclamation/mitigation plans for various resources. Mining reclamation works well for restoring some aspects of resources such as grazing livestock and wildlife, and visual aesthetics. Other resource values may take a long time to return to a full function or may not be restorable at all (e.g., wetlands, groundwater, unique habitats).

16. Noxious weeds are an increasingly difficult problem on western lands. It appears that with coalbed methane development, noxious weeds will be an increasingly greater problem in the Powder River Basin. We note in particular that there are already several weeds identified in the grazing section which are on Wyoming's restricted list – poverty weed or on other states' lists of noxious weeds – cheatgrass. If the drought continues, this area may begin to experience cheatgrass/fire cycles forcing out even more desirable plant species. The FEIS should address if additional mitigation is needed to control the spread of noxious weeds and what types of programs are being developed on an area wide basis to prevent the spread of seeds along roads via mining/construction/drilling equipment.

Wetlands

17. Wetlands Mitigation The wetlands mitigation plan needs to be amended to compensate for the long-term loss of wetlands values during and following mining. The mitigation ratios may need to be increased to compensate for the temporal loss of wetlands. Wetlands obviously cease to function during the 10 to 20 years of mining. However, wetlands fed by groundwater will not regain function until the ground water table recovers. We recommend that additional mitigation be established to compensate for the long-term loss of wetland values. The mitigation plans for previous or current reclamation may provide good locations for increasing wetlands in the area. Alternatively, the mines may want to improve other wetlands damaged by over grazing, poorly constructed roads or off-road vehicle damage.
18. Mitigation of Non-jurisdictional Wetlands It is not clear from the DEIS if all non-jurisdictional wetlands impacts will be mitigated. Executive Order 11990 requires that all

Federal Agencies protect wetlands. The wetlands protection provisions of E.O. 11990 to apply to all wetlands (i.e., jurisdictional and non-jurisdictional). The first paragraph on page 4-61 discusses playa type wetlands which may no longer be identified as jurisdictional waters. The DEIS states “. . . the applicant mines plan to continue establishing playa/depression features within the reclaimed topography if the LBA tracts are mine extensions of existing operations.” The remainder of the paragraph then implies that reclamation costs may be a factor in determining whether or not non-jurisdictional wetlands will be restored. The FEIS should clarify if all non-jurisdictional wetlands will be mitigated.

Wildlife

19. The analysis for wildlife impacts should be based on the habitat needs of the species of concern, rather than the specific boundaries of the mines and lease tracts. There also needs to be sufficient analysis to understand the impacts of the LBA decisions. For example, on page 4-65, the DEIS states that there are no sage grouse leks on the NARO LBAs, there are nesting areas in the NARO complex and recent sage grouse activity nearby. It is not clear if these nesting areas are important to the sage grouse population or if there are sufficient numbers of leks nearby to sustain the population. In addition, this information does not appear to be consistent with the cumulative impacts discussion in the last paragraph of page 4-134, which states that "Few vital sage grouse wintering areas or leks to have been, or plan to be, disturbed as a result of already approved mining and no additional wintering areas or leks would be disturbed if the LBA tracts included in this EIS are leased and mined." By looking at sage grouse habitat on a component by component basis and mainly on LBA and mining properties, the impacts of the LBA decisions are not apparent on the health and sustainability of the grouse population in this area.